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LXXVI.—*Notes on the Coleopterous Family Pselaphidæ of the Group Euplectini of New Zealand, with Descriptions of Two new Genera and Twelve Species.* By Major T. BROWN, F.E.S.

THIS group of the Pselaphidæ, according to the catalogue issued in February last by Herr Junk, of Berlin, consisted then of 128 genera, 13 of which occur in New Zealand. To these I now add two more, *Alloplectus* and *Kenocælus*, which latter is a very curious insect. Two of these genera were described by Dr. Sharp, one by Mr. Leach, eight by M. Raffray, and the others by myself.

In that catalogue sixty-eight New-Zealand species are recorded; four of these are Dr. Sharp's, seven are Herr Reitter's, and fifty-seven are mine; so that the twelve described in this paper make a total of eighty. Besides these, the descriptions of twelve more new species of mine await publication by the New Zealand Institute, and M. Raffray sent to me for inspection seven species, formerly part of Herr Reitter's collection, which, with a single exception, differ more or less from any in my cabinet, and will therefore form a further addition to our list of the Euplectini.

Considering the number of recorded genera and species, and the fact that a species measuring 2 mm. in length by $\frac{1}{2}$ in breadth is a comparatively large one, it must be evident that the manipulation and study of such minute insects of

complex structure are very far from being easily accomplished even by expert entomologists.

As a rule, the species are not so rare as those of our Faronini; nearly all frequent heaps of decaying leaves in the forests, and are seldom found over wide areas.

T. BROUN.

Mount Albert,
Auckland, N.Z.,
8th August, 1911.

List of new Species.

3376. <i>Euplectopsis granulatus.</i>	3382. <i>Zealandius raffrayi.</i>
3377. „ <i>fastigiatus.</i>	3383. „ <i>illustris.</i>
3378. „ <i>mucronellus.</i>	3384. „ <i>fulgens.</i>
3379. „ <i>tumidus.</i>	3385. <i>Alloplectus picipennis.</i>
3380. <i>Vidamus trochanteralis.</i>	3386. „ <i>subcæcus.</i>
3381. „ <i>armiferus.</i>	3387. <i>Kenocœlus dimorphus.</i>

EUPLECTOPSIS, Raffray.

(Genera des Pselaphidæ, p. 82.)

3376. *Euplectopsis granulatus*, sp. n.

Robust, elongate-oblong, slightly convex; head and thorax subopaque, and, like the hind body, fusco-rufous, elytra fulvo-rufous, legs and antennæ red, tarsi and palpi testaceous; pubescence rather scanty on the head and thorax, more conspicuous on the abdomen than on the elytra, the outstanding slender setæ rather numerous.

Head smaller than the thorax, widest in line with the moderately large eyes, obliquely narrowed behind; the shallow frontal depression is not quite smooth and is furcate towards the eyes, but there are no perceptible foveæ; it is punctate-granulose. *Thorax* of about equal length and breadth, rather wider before the middle than elsewhere, rounded there, a good deal narrowed anteriorly, so that its apex is much narrower than the back of the head; median sulcus rather indistinct and ending in the small mesial basal impression, the lateral foveæ shallow, each with a linear prolongation towards the front; the middle of the base and the front are not quite smooth, the rest of its surface is covered with granules, each of these has a small puncture in it. *Elytra* subquadrate, with somewhat rounded shoulders; they are rather longer and broader than the thorax and are only indistinctly and finely punctate; the sutural striæ are deep and, like the short intra-humeral impression on each, are broad and foveiform at the base. *Hind body* almost as

broad as but shorter than the elytra, the basal two segments are horizontal and about equal, the first has a well-marked transverse basal impression, the second is similarly though less deeply impressed, the third is as long as the second in the middle but on a lower plane, the others are deflexed.

Legs only moderately stout; the anterior femora, however, are more incrassate than the other pairs; all the tibiæ are straight inwardly, but arcuate externally.

Antennæ robust, rather short, and bearing rather elongate pubescence; the exposed portion of the basal joint is slightly thicker, but not at all longer than the quadrate second; joints 3-6 are short and transverse, the fifth and sixth are slightly broader than the fourth; the seventh and eighth are strongly transverse and unsymmetrical, being a little prolonged inwardly and broader than the sixth; the ninth and tenth are nearly twice as large as the eighth and are also strongly transverse and unsymmetrical; eleventh conical, largest, as broad as the tenth, not acuminate.

Underside shining. Head finely granulate, without foveæ. Prosternum longitudinally carinate. Basal ventral segment short and thickly pubescent, 2-4 equal, fifth shorter and very slightly incurved, sixth as long as the fifth, incurved behind, seventh broadly conical.

Undoubtedly a near ally of *E. antennalis*, 3205, but readily distinguishable therefrom by the subopaque head and thorax, feebly impressed dorsal thoracic impressions but obvious granular sculpture, thick unsymmetrical antennæ, &c.

♂. Length $1\frac{3}{4}$; breadth $\frac{2}{3}$ mm.

Erua, elevation 2400 feet. A single male found amongst decaying leaves on the 2nd February, 1911.

3377. *Euplectopsis fastigiatus*, sp. n.

Glossy, sanguineous; elytra and legs of a lighter red, tarsi and palpi flavescent; pubescence yellowish grey, conspicuous and mingled with erect hairs on the abdomen; body slightly convex, narrowed anteriorly, the elytra and hind body together oblong and subparallel.

Head rather elongate, not as broad as the thorax, with very prominent eyes, very slightly narrowed behind these, with obtuse angles, antennal tubercles somewhat elevated and moderately distant; nearly smooth and flat in the middle, elsewhere a little uneven and coarsely punctate, but without definite foveæ. *Thorax* nearly a third longer than broad, oviform, widest near the middle, a good deal narrowed towards the front, smooth; from near the apex a linear

groove with subcarinate edges extends into and divides the broad, deep, semicircular, basal fossa, and is prolonged as a carina to the basal margin; lateral foveæ deep and prolonged forwards as distinct grooves, between these and the median groove the surface is somewhat ridged longitudinally towards the base. *Elytra* subquadrate, slightly longer and evidently broader than the thorax, slightly curvedly narrowed at the shoulders; sutural striæ deep, broad, and distinctly foveiform at the base; dorsal impressions short, broad, and deep. *Hind body* with deflexed apical segments, so as to seem shorter than the elytra; first segment with a fine carina at each side of the feeble median impression at the base, second horizontal and about as long as the first.

Femora robust, the posterior much less so; the intermediate tibiæ gradually yet considerably expanded towards the extremity, which is deeply notched.

Antennæ shorter than the head and thorax, moderately slender, with the terminal joints almost forming a triarticulate club; second joint quite oblong and rather longer than the exposed portion of the basal one, third rather longer than broad, obconical, much smaller than second; joints 4-8 submoniliform, small, broader than long, fifth and seventh slightly larger than adjacent ones; ninth subquadrate, twice as large as its predecessor and longer than the transverse tenth, the terminal conical and subacuminate, as long as the preceding two combined.

Male.—Metasternum broadly impressed. Basal ventral segment covered by the femora, ciliate behind, 2-4 equal, fifth widely incurved, the middle hardly more than half the length of the fourth; sixth longer than fifth, widely, deeply, and angularly emarginate; seventh also large and broad.

The male of *E. carinatus*, 3204, has the sides and base of the thorax rather coarsely punctate, but the basal fossa is not so deep; the legs are evidently thicker, and the middle tibiæ are not only thicker but also shorter and less deeply notched at the extremity; the anterior tibiæ have along the inside near the apex a fringe of yellow pubescence which is lacking in this species, and the insect itself is smaller. *E. schizocnemis*, 3203, may be distinguished by the coloration, even and less deeply marked thorax, without the least sign of longitudinal ridging; the elytra are gradually narrowed from near their apices to the base and their striæ are not so deep; the thighs are much stouter, the intermediate tibiæ are broader, the apical excision is larger and the outer angle more prolonged, and the head is only obsoletely punctured.

♂. Length 2; breadth $\frac{3}{4}$ mm.

Mount Pirongia, December 1909. I found a single male only.

3378. *Euplectopsis mucronellus*, sp. n.

Elongate, moderately narrow, slightly convex, shining, castaneo-rufous, tarsi and palpi fulvescent; the clothing greyish, rather short, and thinly distributed.

Head much smaller than the thorax, nearly straight behind the rather small and hardly at all prominent eyes, slightly narrowed anteriorly, antennal tubercles somewhat flattened backwards; the foveæ not sharply defined, prolonged and convergent in front; there are no perceptible punctures. *Thorax* suboviform, rather longer than broad, gently rounded and slightly broader before the middle; dorsal sulcus narrow, extending from before the middle to the moderately deep but not broad semicircular basal fossa; lateral foveæ deep, subrotundate, rather large, but not distinctly prolonged anteriorly, the antebasal transverse impression normal. *Elytra* a third longer than the thorax, oblong, only slightly narrowed near the base; sutural striæ deep, punctiform at the base, with a distinct basal puncture alongside each; dorsal impressions rather short, broad, and deep at the base. *Hind body* almost as broad as but rather shorter than the elytra, its basal three segments equal.

Legs elongate and moderately slender, the intermediate tibiæ gently arched externally and minutely prominent at the inner extremity.

Antennæ shorter than the head and thorax, moderately slender, their second joint fully as long as the visible portion of the thicker basal one; third smaller, rather longer than broad, gradually narrowed towards its base; joints 4-8 small, each about as long as broad, seventh very slightly longer; ninth subquadrate, a little larger than preceding ones; tenth transverse, moniliform, but little broader than ninth; the terminal conical and acuminate, as long as the preceding two united.

Underside chestnut-red, with grey pubescence. Metasternum unimpressed. Ventral segments 2-4 equal, fifth widely incurved, not quite as long as the fourth in the middle, sixth more deeply incurved, seventh broad, as long as the penultimate.

After a careful comparison with Reitter's types, I fail to find one that accords with this species; the nearest, but only so far as the middle tibiæ are concerned, is *E. microcephalus*. An undescribed species, now in possession of M. Raffray, is

very closely allied, but joints 5-7 of the antennæ are oblong-oval and the head is slightly broader.

♂. Length $1\frac{2}{3}$; breadth $\frac{1}{2}$ mm.

Southland. A single individual from Mr. A. Philpott.

3379. *Euplectopsis tumidus*, sp. n.

Shining, somewhat convex, moderately elongate; sanguineous or rufo-castaneous, rather variable; legs and antennæ paler, tarsi and palpi fulvescent; pubescence yellowish, rather short and more or less curled, the hind body with a few long erect hairs.

Head rather smaller than the thorax, slightly rounded behind the rather small medially situated eyes; antennal tubercles distant and subrotundate, not prominent; the surface distinctly and near the sides closely punctate, the rounded foveæ not very deep or sharply defined, and more or less confluent with the frontal impression. *Thorax* cordiform, about as long as broad, indistinctly punctate; the median furrow deep and broad, extending from the front to the deep, subquadrate, basal fossa; the lateral foveæ large, but becoming linear towards the apex, with a thin transverse impression uniting them with the central fossa. *Elytra* slightly broader than long, evidently larger than the thorax, curvedly narrowed near the base; sutural striæ well marked, deeper and foveate at the base, the dorsal ones also deep and broad, but becoming shallow before the middle. *Hind body* shorter than the elytra, its first segment horizontal, broadly medially impressed at the base, the others gradually deflexed. *Legs* simple, tibiæ nearly straight.

Antennæ shorter than the head and thorax, rather slender, finely and scantily pubescent; basal joint red, slightly longer than the oblong-oval second; joints 3-9 hardly differ, all subglobular and small; tenth transverse, evidently broader than the preceding ones; eleventh a little broader than tenth at the base, conical and distinctly acuminate, and, including the narrow apical appendage, as long as the preceding four combined.

Male.—*Underside* fusco-rufous, very thinly clothed; the head with elongate erect setæ, relatively coarsely punctate, with a slender frontal carina and a large depression at the base. Prosternum with a fine carina along the middle. Abdomen rather longer than the convex metasternum: basal segment covered by the femora, second rather large, broadly medially emarginate at the apex, much swollen outwardly; third, in front, with a deep sinuosity at each side of the

median angular prominence; fourth and fifth very short in the middle, together shorter than the third; sixth slightly longer than fifth, widely yet slightly incurved, seventh rather longer, transverse, rounded.

Female. — Basal dorsal segment similarly impressed; second ventral segment slightly longer than third, the next two, singly, a little shorter than the third; sixth curvilinearly triangular, about as long as the preceding two combined.

The form and sculpture of the head and thorax, the elongate and very acuminate terminal joint of the antennæ, in conjunction with the remarkable second and third ventral segments of the male, distinguish this species. It is entirely different from the more cylindrical series, such as *E. parvulus*, 2727, and Reitter's *E. microcephalus*. It must be placed at the end of the genus, as the deep thoracic sculpture closely resembles that of Raffray's *Plectomorphus*.

Length $1\frac{2}{3}$; breadth nearly $\frac{2}{3}$ mm.

Erua, January 1910; Waimarino, and also found amongst leaf-mould sent to me from Makatote by Mr. W. S. Guinness.

About a dozen specimens of this somewhat variable species.

VIDAMUS, Raffray.

(Genera des Pselaphidæ, p. 89.)

3380. *Vidamus trochanteralis*, sp. n.

Shining, castaneo-rufous, sometimes much paler, antennæ and legs fulvescent; the clothing rather elongate and conspicuous on the hinder parts, and mingled with a few erect slender setæ.

Head large, a 'good deal rounded behind the prominent eyes, not definitely punctate; the foveæ large but not very deep, on about the same plane and continuous with the depressed frontal portion. *Thorax* hardly wider than the head at or just before the middle, much narrowed anteriorly, a little longer than broad, the disc smooth; basal median fossa somewhat angulate, the transversal linear impression between it and the large lateral foveæ sometimes indistinct, the basal margin indistinctly tripunctate. *Elytra* about as long as broad, wider than thorax at the base, still more so behind, and obviously longer than that is; sutural striæ well marked throughout and punctiform at the base, intrahumeral striæ deep but short; between these striæ on each elytron there is a distinct basal puncture. *Hind body* rather narrower than the elytra, the basal visible three segments almost equal.

Legs moderately elongate and slender, tibiæ nearly straight ; the middle pair gradually but not strongly incrassate towards the extremity and armed on the inside with a calcar-like process which is directed backwards but does not attain the apex.

Antennæ moderately elongate and bearing long slender hairs ; first joint stouter, yet not much longer than second ; joints 3, 5, and 7 oblong, sixth and eighth smaller than adjacent ones, tenth distinctly larger than ninth, both subquadrate, eleventh as long as the preceding two united, conical and subacuminate.

Underside with greyish pubescence. *Prosternum* not carinate. *Metasternum* transversely convex, but impressed or flattened in the middle. Basal *ventral segment* partly concealed by the femora ; segments 2-4 gradually decrease in length, fifth still shorter and slightly medially incurved behind ; sixth rather ill-defined, in the middle about the length of the third, sinuate at each side ; seventh conical. The intermediate *trochanters* are spined.

Female.—Sixth segment large, punctate, and broadly triangular.

In one male the true basal dorsal segment is quite exposed and nearly covered with minute brassy squamæ, in all the others this segment is entirely concealed.

♂. Differentiated from *V. calcaratus*, 3210, by the smaller size, manifestly more slender legs, far less distinct armature of the intermediate tibiæ, narrower thorax, and spined trochanters.

Length 2 ; breadth quite $\frac{1}{2}$ mm.

Erua and Waimarino, elevation 2400-2700 feet, January 1911.

I secured a dozen specimens ; some slight variations occur amongst them, but the male characters seem to be constant.

3381. *Vidamus armiferus*, sp. n.

Slender, elongate, depressed, nitid ; fusco-rufous, head and thorax of a lighter hue, legs and antennæ fusco-testaceous, pubescence greyish ; more or less finely punctate, the abdomen most distinctly.

Head as large as the thorax, slightly rounded behind the small eyes, gradually narrowed anteriorly ; interocular foveæ well marked, but somewhat indistinctly prolonged and convergent in front. *Thorax* rather longer than broad, oviform ; lateral foveæ rotundate, basal fossa small, angular, and transverse, with a median groove extending from it to the base,

the usual antebasal impression is distinct. *Elytra* oblong, rather longer and broader than the thorax, moderately narrowed near the base; sutural striæ broad, foveiform at the base, intrahumeral impressions foveiform, short, but not deep. *Hind body* much shorter than the elytra, finely yet quite perceptibly punctured; second segment almost as long as the first, longitudinally subcarinate in the middle, and somewhat impressed towards the sides; the third as long as the first in the middle, broadly rounded there at the apex.

Legs proportionally moderately stout, the intermediate tibiæ armed with a distinct calcar at the inner extremity.

Antennæ almost as long as the head and thorax, second joint oviform and nearly as large as the basal one; joints 3-8 moniliform, the fourth, sixth, and eighth equally small, fifth and seventh very slightly broader; ninth and tenth transverse, the former distinctly broader than the eighth, but not quite as broad as the tenth; the terminal large, conical and subacuminate, and as long as the preceding three united.

The following are distinctive features:—The slender form, infusate surface, the armature of the intermediate tibiæ, and medially subcarinate second dorsal segment. *V. spinipes*, 3048, is a larger stoutly built insect, with a spine between the middle and inner apex of the middle tibia, and its thorax is cordate.

♂. Length $1\frac{1}{2}$; breadth $\frac{1}{3}$ mm.

Greymouth. One damaged specimen from Mr. J. H. Lewis.

ZEALANDIUS, Raffray.

(Genera des Pselaphidæ, p. 111.)

3382. *Zealandius raffrayi*, sp. n.

Shining, dark rufous; legs and antennæ paler, tarsi and palpi obscurely fulvescent; pubescence pale brassy, decumbent, rather short and thick, but, on the thorax particularly, mingled with very slender hairs; along the sides and on the hind body there are a few outstanding setæ.

Head large, not quite the breadth of the thorax, narrowed in front of the small coarsely faceted eyes; genæ nearly straight, with obtuse hind angles; occipital foveæ rather large yet not distinctly prolonged forwards, the interantennal portion a little depressed and less evidently punctate than the sides or vertex. *Thorax* of nearly equal length and breadth, rounded and widest before the middle; its punctuation irregular, rather indistinct on the disc, but closer and coarser

near the base; median groove broad and deep, extending almost from the apex into the large basal depression, which, however, is not distinctly united to the large lateral foveæ. *Elytra* about as long as broad, more or less narrowed towards the shoulders, rather finely and distantly but not very definitely punctured; the sutural and dorsal striæ are broad, with subcarinate intervals. *Hind body* as broad as the elytra, indistinctly punctate; third segment in the middle slightly longer than the second or first, the others deflexed and attenuate.

Legs stout and elongate, front and middle femora stouter than the posterior; intermediate tibiæ distinctly curved and thicker than the others, notched at the extremity, the outer angle somewhat prolonged, the inner prominent but not exactly calcarate; the extremity of the anterior is of nearly similar structure, but less distinctly so.

Antennæ nearly as long as the head and thorax, basal joint red, punctate, cylindrical; second ovate-oblong, not quite so thick as the first, but as long as the third and fourth combined; fifth slightly longer than adjacent ones, eighth moniliform, evidently smaller than the ninth or seventh, the tenth distinctly broader than its predecessor, narrowed apically, the terminal large, conical, and acuminate.

Underside shining, the pubescence rather more conspicuous on the middle of the second and sides of the last segments. Prosternum longitudinally carinate in front. Metasternum with a large median impression and a short, thick, longitudinal carina at its base. Basal ventral segment concealed by the femora, segments 3-5 nearly equal, sixth rather longer than fifth, medially arcuate-emarginate, the operculum of the seventh oblong and in some lights appearing foveate or impressed at each side. Intermediate trochanters subtriangular and distinctly spined; the posterior prominent, with a rather thick process, not a spine, situated behind and close to the coxæ.

Female.—Very similar. Head rather more distinctly punctured. Joints 6 and 8 of the antennæ rather smaller than the contiguous ones, as is sometimes the case in the other sex, 3-5 also vary a little, being either bead-like or obovical.

The type of the genus, *Z. obscurus*, 2478, is a very different insect, being subopaque, much smaller, with rather dense distinct punctation, but rather feeble thoracic impressions.

Length 2; breadth quite $\frac{1}{2}$ mm.

Erua, elevation 2100 feet. Both sexes found by me in

January 1911, and a male found amongst decaying leaves collected by Mr. W. J. Guinness near Mount Ngauruhoe.

This, the finest species of the genus, is named in honour of M. Achilles Raffray, who has spent the best of his lifetime in studying the Pselaphidæ.

3383. *Zealandius illustris*, sp. n.

Nitid, slightly convex, castaneo-rufous; antennæ, palpi, and legs fulvescent; pubescence short, pale yellowish, very scanty on the head and thorax, and with a few upright elongate hairs on the hind body.

Head rather elongate, not as broad as the thorax, slightly narrowed behind the small convex eyes; relatively coarsely and irregularly but not closely punctured, its surface nevertheless is quite shining; interocular foveæ small, not sharply defined, and only very indistinctly prolonged forwards, the interantennal portion depressed. *Thorax* of about equal length and breadth, widest before the middle, rounded there, much narrowed anteriorly; its punctation like that of the head, but more distant and shallow on the disc and nearly obsolete in front; lateral foveæ subrotundate, median sulcus rather broad, almost touching the front and dividing the transverse basal impression. *Elytra* suboblong, gradually narrowed towards the shoulders, without visible punctation; sutural and dorsal striæ broad, deep at the base, the dorsal becoming shallow near the apices, the lateral indistinct, with subcarinate interstices; the extremity of each elytron, near the side, is slightly raised, but not tuberculate. *Hind body* as broad as the elytra, apparently impunctate, its basal three segments almost equal, the first with an indefinite median transverse impression at the base.

Antennæ moderately elongate, finely pubescent; basal joint rufescent, stout, cylindric, the next oblong-oval, more slender, and rather shorter; third and fourth obconical, rather small, fifth oblong-oval, seventh rather longer than the subquadrate sixth or eighth, the ninth evidently larger than the eighth but not as broad as the transverse tenth; the terminal large, about as long as the preceding two together, conical and distinctly acuminate.

Legs moderately elongate, femora stout; the intermediate tibiæ thicker than the others, abruptly narrowed at the extremity, so that near that point on the inside there is an angulation or obtuse calcar; the anterior are similarly but much less distinctly angulate near the apex.

Underside finely and irregularly punctate and pubescent. Head with a well-marked basal fovea and a fine longitudinal carina in front. Prosternum finely carinate along the middle. Metasternum with a large median fovea. Ventral segments 2-4 very short in the middle, fifth excessively reduced in length, almost linear; the sixth in the middle as long as the preceding three conjointly, with a large central impression, the terminal as long as the sixth but narrower. Posterior coxæ prominent, the trochanters subtriangular and acutely produced or medially spiniform behind.

The foveate metasternum and penultimate ventral segment, the spiniform posterior trochanters, abbreviated basal ventral segments, and the structure of the middle pair of tibiæ are good distinguishing characters.

♂. Length $1\frac{1}{2}$; breadth $\frac{1}{2}$ mm.

Mount Pirongia, December 1909. A single male is all I could find.

3384. *Zealandius fulgens*, sp. n.

Subdepressed, moderately broad, quite glossy; castaneorufous, legs and antennæ somewhat fulvescent, tarsi and palpi testaceous; pubescence yellowish grey; the punctation obsolete.

Female.—*Head* as large as the thorax, gradually narrowed before the minute eyes, feebly rounded behind them, with obtuse hind angles, its sculpture rendered indistinct by the pubescence; the foveæ moderate, not deeply prolonged anteriorly, antennal tubercles small and distant. *Thorax* broadly cordate, median groove rather deep and broad, extending from the front to the deep, angular, basal fossa; lateral foveæ deep and subrotundate, not distinctly united to the central fossa; the sides in front of them appear swollen. *Elytra* nearly a third longer than the thorax, a little broader than they are long, gradually narrowed towards the base, with rounded shoulders; the sutural and dorsal striæ broad, deep near the base, rather shallow near the apices, the intervals convex, lateral striæ indefinite. *Hind body* as long as the elytra, basal three segments equal, the others deflexed.

Antennæ hardly as long as the head and thorax, moderately stout; basal joint rufous, cylindric, its length nearly double the breadth, second oblong-oval, much shorter than the first but as thick, third small and obconical; joints 4-8 small and moniliform, the fifth and seventh only slightly larger; ninth rather broader than eighth, but not as large as

the transverse teeth; the terminal large, conical, and acuminate, about as long as the preceding three combined.

Male.—*Underside* shining chestnut-red, with fine yellowish pubescence. Head foveate behind. Prosternum rather short, carinate along the middle. Metasternum with a subrotundate depression. Intermediate and posterior trochanters spined. Abdomen with segments 2-6 decreasing in length, the second medially convex and with a linear impression towards each side, the frontal suture of the third open and rather deep, with a small central depression within it; sixth slightly shorter than fifth, widely emarginate, the supplementary obtusely triangular.

The male characters of the North Island *Z. raffrayi* and *Z. illustris* are sufficiently distinctive. The female is obviously more glossy, broader, and with thicker legs than the same sex of *Z. usitatus*, 3050, from Broken River. The head is broader behind the eyes. The thorax is evidently broader, with much deeper impressions, and the elytral striæ are deeper. The antennæ are longer and stouter, with larger tenth and eleventh joints.

Length 2; breadth $\frac{2}{3}$ mm.

Greymouth. Two specimens from Mr. J. H. Lewis, the male unfortunately without the middle pair of legs.

ALLOPLECTUS, gen. nov.

Body moderately elongate, subdepressed. *Head* shorter than the thorax, as broad in line with the eyes, obliquely narrowed anteriorly, genæ nearly straight, with obtuse angles; bifoveate in line with the front of the eyes, and with a median groove behind. *Eyes* rather large but only slightly convex, situated just behind the middle, extending downwards and occupying a larger space underneath than above. *Antennal tubercles* small, moderately elevated, subcontiguous. *Thorax* longer than broad, rounded, and slightly wider before the middle than at the base; without discoidal impressions, but with a well-marked linear impression in front of the base uniting with the elongate lateral foveæ. *Elytra* oblong, about twice the length of the thorax, slightly narrowed towards the base; sutural striæ deep, punctiform at the base, the dorsal also deep but only moderately elongate. *Hind body* much shorter than the elytra, the basal three visible segments margined, the first rather longer than the second, horizontal, the others deflexed, but not abruptly.

Tarsi with single claws, basal joint of the posterior small, the next thick and nearly twice the length of the third.

Maxillary palpi small, first joint invisible, second elongate and slightly curved, third globular, fourth fusiform. *Antennæ* rather distant at the base, the exposed portion of the basal joint scarcely longer than broad, second as stout, ovi-form; joints 3-8 small and moniliform, eighth rather shorter than seventh; the ninth very short, slightly broader than the preceding, tenth strongly transverse, nearly double the width of the ninth; terminal large, as broad as the penultimate, as long as joints 7-10 combined, conical and acuminate, and bearing very slender elongate pubescence.

Male.—*Prosternum* not carinate. *Metasternum* elongate, convex, with a median impression behind. *Abdomen* with the basal segment covered by the femora, bearing elongate pubescence behind; segments 2-5 gradually decrease in length, fifth slightly but widely incurved behind; sixth nearly twice the length of the fifth, deeply and somewhat angularly emarginate at the extremity; seventh distinct, subrotundate, with a slight median fissure or groove along its hinder portion.

The male characters are derived from a specimen found at Tarukenga, near Rotorua; the other part of the description from the original specimen obtained at Maketu, Hunua Range.

This genus is instituted for the more systematic location of my *Euplectus claviger*, 2483, which in 1893 I placed by itself as the exponent of a new genus in Section VIII. of the New Zealand Euplectini (Ann. & Mag. Nat. Hist. ser. 6, vol. xv. p. 71). A third individual having been found, I sent it to M. Ach. Raffray, who confirms my opinion, and states that this new genus comes near his *Euplectodina*, which occurs at Siam and Java.

3385. *Allopectus picipennis*, sp. n.

Subdepressed, elongate, narrow, glossy; light chestnut-red, elytra somewhat piceous, legs and antennæ testaceous; pubescence decumbent, greyish, scanty on the head and thorax.

Head shorter than the thorax, nearly as broad, with rounded hind angles; bifoveate in line with the front of the rather large eyes, and with an indistinct longitudinal stria behind. *Thorax* only slightly longer than broad, oviform, rounded and widest at the middle, more narrowed towards the front than behind; with a transverse impression near the

base connecting the small, shallow, subrotundate lateral foveæ with the small punctiform central one. *Elytra* oblong, rather broader and obviously longer than the thorax; with well-marked sutural striæ, which are foveiform at the base, as are the distinct, moderately elongate, dorsal impressions. *Hind body* as broad as the elytra, but quite a third shorter, segments 3-5 deflexed, the second as long as the first, the latter slightly medially impressed at the base.

Antennæ scarcely as long as the head and thorax, second joint nearly oviform, hardly longer than broad, as large as the visible portion of the first; the others, including the large distinctly pubescent terminal one, similar to those of *A. claviger*.

This species may be recognized at once by the dark, elongate, glossy elytra, impressed basal dorsal segment, and shorter antennæ. *A. claviger* is of an almost uniform light chestnut-red, and is without any perceptible central fovea in the transverse depression of the thorax.

Length quite 1; breadth $\frac{1}{3}$ mm.

Howick, near Auckland. I have only succeeded in finding one specimen.

3386. *Alloplectus subcaecus*, sp. n.

Nitid, light castaneo-rufous; elytra and abdomen slightly darker, yet quite rufescent and rather dull; legs and antennæ somewhat fulvescent; pubescence greyish, depressed and distinct.

Head nearly as long as the thorax, subtrigonal, its hind angles obtusely rectangular, indistinctly punctate, the frontal foveæ and linear basal impression rather shallow. *Eyes* minute. *Thorax* suboviform, rounded and widest before the middle, only slightly longer than broad, its punctation shallow and not close, but quite discernible under a good lens; lateral foveæ indistinct, the central one somewhat angulate and forming part of the transverse basal impression. *Elytra* rather broader and slightly longer than the thorax, feebly curvedly narrowed towards the base; dorsal impressions punctiform at the base, rather small and indefinite, sutural striæ linear, also punctiform at the base. *Hind body* as broad and nearly as long as the elytra, the first segment with a short median basal depression and equalling the second in length, the others deflexed.

Antennæ nearly as long as the head and thorax, second joint subrotundate, as thick as the short exposed portion of the basal one; third just perceptibly longer than broad,

small and subobconical; joints 4-8 small, subglobular, and short; ninth a little broader than eighth, but hardly more than half the width of the transverse tenth; the terminal large, rather short, broadly conical, subacuminate, finely but thickly pubescent, and nearly double the breadth of the tenth.

In all three species the antennal structure is almost precisely similar, so, too, is the size of the insects. This species may, however, be considered aberrant, owing to the sub-trigonal head and minute eyes. It is rather narrower than the others, and may be distinguished by the punctation and less definite intrahumeral impressions.

Length quite 1; breadth $\frac{1}{3}$ mm.

Retaruke Forest, near Erua. I found a solitary individual amongst decayed leaves collected for me by Capt. Whitchorn in April 1910.

KENOCELUS, gen. nov.

Body only moderately elongate in the male; in the female narrower, with the elytra somewhat rounded at the sides and more narrowed towards the base and the hind body more horizontal.

Head quadrate, much shorter than the thorax, plane above, short and vertical in front, without antennal tubercles, vertex bifoveolate; the lower surface at each side is slightly dilated in front of the eyes, and prolonged forwards as a process which, in front, is slightly separated from the side; just above this there is a cavity in which the maxillary palpus is accommodated and almost entirely concealed from above. *Thorax* longer than broad, with a sulciform median fossa near the base and a fovea at each side; these are more or less indefinitely united, according to the point of view, by a linear transverse impression. *Elytra* subquadrate, obviously broader than the thorax, with distinct sutural striæ and a short foveiform impression near each shoulder. *Hind body* rather shorter than the elytra, its first and second visible segments broadly margined, horizontal, and subequal, the third with thinner margins, this and the following two gradually deflexed.

Legs stout and elongate; tibiæ arcuate externally; basal joint of the tarsi minute, the intermediate nearly double the length of the third, with a single claw.

Antennæ 11-articulate, as long as the head and thorax, stout, of nearly the same thickness throughout, inserted within the upper part of the cavity occupied by the palpi;

the exposed portion of the basal joint only about half as long as it is broad; second and third joints obconical, hardly longer than broad; joints 4-8 differ but little, all broader than long, ninth and tenth a little larger, eleventh conical and subacuminate, longer than the penultimate.

First *ventral segment* short and covered by the femora, the next unevenly convex in the middle, third quite as long as the second, with a basal depression at each side of the middle; fourth and fifth short, the latter widely but not deeply incurved behind; sixth with a deep, semicircular, apical emargination, which is occupied by the flat, broadly oval, supplementary segment.

Female.—Second and third ventral segments nearly equal, fourth and fifth much shorter, sixth large, obtusely triangular.

A written copy of the description of the male and a specimen of the female have been forwarded to M. Ach. Raffray. He kindly informs me that this exceedingly curious new genus belongs to a new and very isolated section of the Euplectini.

3387. *Kenocælus dimorphus*, sp. n.

Shining, rufescent, tarsi and palpi yellow, terminal joint of antennæ fulvescent; sparingly clothed with decumbent greyish pubescence.

Head quadrate, slightly flattened and quite obsoletely bifoveolate in front, very finely and distantly punctate, with a pair of small, distant, interocular foveæ. *Eyes* moderately large and prominent, situated behind the middle. *Thorax* nearly twice as long as broad, widest and somewhat rounded just before the middle, slightly sinuate behind, very finely and distantly punctate, with a slight antebasal impression connecting the rather shallow lateral foveæ and the sulciform median depression. *Elytra* longer and broader than the thorax, a little narrowed towards the base, finely punctate, with rather fine sutural striæ, the intra-humeral impressions rather short and shallow.

Female.—Eyes very small and indistinct. The body less nitid and darker, elytra more rounded at the sides and narrower at the base, and the hind body more horizontal and therefore apparently longer.

♂. Length $1\frac{2}{3}$; breadth nearly $\frac{2}{3}$ mm.

♀. Length nearly 2; breadth $\frac{1}{2}$ mm.

Greymouth. One male and two females, discovered by Mr. J. H. Lewis, somewhat damaged unfortunately.